APPARATUS AND METHOD FOR REDUCING POWER CONSUMPTION IN WIRELESS RF SYSTEMS

ABSTRACT OF THE DISCLOSURE

A radio frequency (RF) transceiver having improved low power operating modes. The RF transceiver comprises: 1) a radio frequency (RF) modem section comprising: a) receive path circuitry for receiving and down-converting an incoming RF signal to thereby produce an incoming baseband signal; and b) transmit path circuitry for receiving and up-converting an outgoing baseband signal to thereby produce an outgoing RF signal; 2) a baseband section comprising baseband circuitry for receiving and processing the incoming baseband signal and for generating the outgoing baseband signal; and 3) a power-saving apparatus for determining that the baseband section is idle and, in response to the determination, reducing a power supply voltage providing power to the baseband section.